

**MEDIUM-DUTY LOGIC JACKSHAFT OPERATOR** 

# **Standard Features**

- For high or vertical lift sectional doors or small rolling doors and grilles
- Medium-Duty Logic programmable integrated circuit board

Safest Installations, Smartest Innovations

- High starting torque motor with overload protection
- Adjustable friction clutch
- Solenoid brake standard
- Built-in 315 MHz receiver



Includes the Medium-Duty Logic Board with Built-In Receiver

**UL325-2010 Compliant Medium-Duty** Logic technology provides primary monitored entrapment protection; a required safety regulation. This insures that the appropriate safety devices, a monitored photo sensor or monitored sensing edge, are functional in all operator formats.

The innovative design of Medium-Duty Logic also provides reliable service and exceptional value to economically meet the needs of a variety of commercial door applications.

# Added Value, Convenience and Compliance

- UL325-2010 Monitored Entrapment Capability
  - Provides primary monitored entrapment protection through monitored photo sensors, either CPS-U or CPS-UN4, or a 4-wire monitored edge using the CPS-EI interface
- UL-Listed and UL-Labeled to insure compliance to local codes and approval at final inspection
- Integrated timer-to-close (TTC)
  - Programmable from 5 to 60 seconds in 5 second increments
  - Allows for timed automatic door closure after the door reaches the full open position
  - Requires monitored safety devices, either CPS-U, CPS-UN4 or CPS-EI
- Integrated 3-channel radio
  - Learn/program up to 20 Chamberlain® 315 MHz remote controls
  - Recognizes Security+® and DIP switch remote controls
  - Compatible with 3-button remote controls for open/close/stop operation
- Integrated 90-second maximum run timer



#### **COMMERCIAL DOOR OPERATOR**

MAXIMUM DOOR AREA (SQ. FT.)						
ROLLING	24 ga. Steel	22 ga. Steel		20 ga. 18 ga. Steel	16 ga. Steel	
	Alum. Grilles	Alum. Doors	_	Steel Grilles		
SECTIONAL		24 ga. 22 ga. Steel	20 ga. Steel		16 ga. Steel	
	Fiber- glass	Alum. Doors	Wood Doors		_	
			24 ga. Steel Insul.		20 ga. Steel Insul.	16 ga. Steel Insul.
SQ.	320	275	250	200	160	120

- NOTE: 1. The MJ operator is not recommended for use on large or high rolling doors without chain hoist modification (see Model MH).
  - 2. On steel insulated doors, a 24 ga. back panel is assumed.
  - 3. Maximum recommended duty cycles: 12 cycles per hour

# Standard Features

#### Motor

Powerful 1/2 HP, 115V single-phase motor with instant reverse, capacitor start and overload protection. Removable without affecting limit switch settings.

#### • Floor Level Disconnect

Floor level disconnect provides emergency manual operation.

#### • Operator/Motor Control

Solid-state Medium-Duty Logic circuit board.

# • Control Circuit

24V NEC Class 2.

# Wiring Type

All operators are factory preset to C2 mode, providing momentary contact to open and stop, with constant contact to close. Monitored entrapment protection, using approved photo sensors or sensing edges, is optional, although recommended, when using this wiring type. Momentary contact to close (B2 mode) is an available optional wiring type, but can only be selected when the appropriate monitored entrapment protection device, either LiftMaster® CPS-U / CPS-UN4 photo sensors or a monitored 4-wire sensing edge (via the CPS-EI interface), is present. The Medium-Duty Logic operator is prewired to accept CPS-U/ CPS-UN4 / CPS-EI monitored entrapment protection devices.

#### Drive Reduction

First-stage heavy-duty 4L V-belt; second and third stages #48 chain.

#### Friction Clutch

Adjustable friction clutch helps protect against damage to the door and operator should the door meet an obstruction.

#### • Brake

Heavy-duty solenoid-actuated brake.

#### Push Button Station

3-button station, for open/close/stop functions, is standard for all operators. Controls with 1, 2 and 3 buttons are available.

#### • Radio Receiver

315 MHz radio receiver is integral to the Medium-Duty Logic board. Accepts up to 20 Security+ $^{\circledcirc}$  remote controls and unlimited DIP switch remote controls.

# Construction

NEMA 1 type electrical box, heavy-duty 11-gauge steel frame with baked-on powdercoat finish, all reduction sprockets drilled and pinned to shafts.

# Control Accessories and Options

#### Sensing Edge

If CPS-U / CPS-UN4 photo sensors are present, a non-monitored 2-wire electric edge or pneumatic (air hose) edge may be used as an ancillary protection device if using B2 mode. For C2 mode only, installation of either a 2-wire electric or pneumatic edge is optional.

#### Radio Control

Universal remote controls and receivers are available to signal the operator to open, close and stop.

# • Emergency Egress Device

Attractive faceplate mounts flush to the wall and contains handle to disconnect operator from a grille, thereby allowing the grille to be opened manually or by spring tension.

### Rolling Door Interlock Switch

Interlock switch disables the operator control circuit when a manual door lock is engaged, preventing damage to the door and operator.

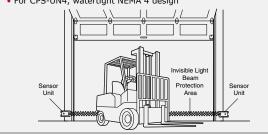
## • Wireless Access Control Devices

Weather-proof single or 3-button wireless control stations are available and are compatible with the Medium-Duty Logic on-board receiver. In addition, a choice of either a 5 or 250-code wireless keypad is available. Wireless controls should be used to supplement hard-wired controls and should not be used in place of such controls unless a safety device, such as photo-eyes or a sensing edge, is present.

# CPS-U / CPS-UN4 Commercial Protector System®

These photo sensors are designed to sense an obstruction and instruct the operator to reverse the closing door to the full open position.

- Signals operator continuously to provide regulatory mandated requirements regarding monitored entrapment protection
- LED indicators for quick alignment
- · Safety of a non-contact infrared reversing sensor
- Heavy gauge mounting brackets
- Quick installation and pre-molded for 1/2" trade size conduit fitting (CPS-UN4)
- Bright yellow safety color
- For CPS-UN4, watertight NEMA 4 design



# Clearance Mounting and Details

